Application No. 10/752,005 Amendment dated February 5, 2007 Reply to Office Action of October 5, 2006

## AMENDMENTS TO THE CLAIMS

- 1. (Original) A drum type washing machine comprising:
- a drum rotatably installed in a cabinet;
- a driving motor installed at one side of the cabinet for rotating the drum;
- a vapor generator installed at one side of the cabinet for generating vapor;
- a diverging pipe installed at an upper side of the drum for supplying vapor generated from the vapor generator to inside of the drum;
  - a first connection hose for connecting the vapor generator and the diverging pipe;
- a drain pipe installed at a lower side of the drum for draining wash water inside of the drum:
  - a second connection hose for connecting the drain pipe and the diverging pipe; and
- a circulation pump installed between the second connection hose and the drain pipe for circulating wash water drained from the drum.
- 2. (Original) The drum type washing machine of claim 1, wherein an injection nozzle is formed at an end portion of the diverging pipe.
  - 3. (Cancelled)
  - 4. (Currently Amended) A vapor generator of a drum washing machine comprising:
- a case provided with a space portion for storing water therein, a water supplying portion for supplying water at one side thereof, and a vapor exhaustion portion for exhausting vapor at another side thereof;
- a water level detecting means installed at the case for detecting a level of water stored in the case; and
  - a heater installed in the case for heating water stored in the case,
  - The vapor generator of claim 3, wherein the case comprises:
  - a lower case where the heater is installed;

Amendment dated February 5, 2007
Reply to Office Action of October 5, 2006

an upper case coupled to the lower case;

- a watertight member interposed between the lower case and the upper case; and
- a case coupling means for coupling the lower case and the upper case.
- 5. (Original) The vapor generator of claim 4, wherein the case coupling means comprises:
- a lower flange portion formed at an outer circumferential surface of the lower case and having a plurality of bolt holes;

an upper flange portion formed at an outer circumferential surface of the upper case and having a plurality of bolt holes; and

a bolt coupled to the bolt hole.

another side thereof;

- 6. (Currently Amended) The vapor generator of elaim 3 claim 4, wherein the heater comprises:
  - a heat transmitting pipe arranged at a bottom surface of the case; and
- a connector installed at both ends of the heat transmitting pipe to be connected to an external power source.
- 7. (Currently Amended) A vapor generator of a drum washing machine comprising:

  a case provided with a space portion for storing water therein, a water supplying portion
  for supplying water at one side thereof, and a vapor exhaustion portion for exhausting vapor at

a water level detecting means installed at the case for detecting a level of water stored in the case; and

a heater installed in the case for heating water stored in the case,

The vapor generator of claim 3; wherein a vapor storing groove space for storing vapor generated by the heater is formed at a position corresponding to the vapor exhaustion portion at an inner surface of the case.

Docket No.: 0630-1906P

Application No. 10/752,005 Amendment dated February 5, 2007 Reply to Office Action of October 5, 2006

8. (Currently Amended) The vapor generator of claim 7, wherein a the the vapor exhaustion portion is a pipe.

- 9. (Original) The vapor generator of claim 7, wherein a diaphragm for preventing water inside of the case from being introduced into the vapor exhaustion portion is formed at an inner surface of the case.
- 10. (Original) The vapor generator of claim 9, wherein a plurality of slots are formed at the diaphragm.
- 11. (Original) The vapor generator of claim 10, wherein the slots are formed in a longitudinal direction.
- 12. (Currently Amended) A vapor generator of a drum washing machine comprising:

  a case provided with a space portion for storing water therein, a water supplying portion

  for supplying water at one side thereof, and a vapor exhaustion portion for exhausting vapor at

  another side thereof;

a water level detecting means installed at the case for detecting a level of water stored in the case; and

a heater installed in the case for heating water stored in the case,

The vapor generator of claim 3, wherein the water level detecting means is a water level detecting sensor.

13. (Currently Amended) The vapor generator of claim 12, wherein the water level detecting sensor comprises:

a body coupled to an upper portion of the case; and

three a plurality of detecting rods longitudinally installed at the body.

Amendment dated February 5, 2007 Reply to Office Action of October 5, 2006

14. (Currently Amended) The vapor generator of claim 13, wherein said three the plurality of detecting rods are arranged at the body with 120°, and a diaphragm is installed at a lower portion of the body for covering the detecting rods.

- 15. (Original) The vapor generator of claim 14, wherein the diaphragm is provided with slots in a longitudinal direction.
- 16. (Currently Amended) The vapor generator of claim 13, wherein the detecting rods emprises comprise:
  - a first detecting rod which has a longest length;
  - a second detecting rod which has a middle length; and
  - a third detecting rod which has a shortest length.
- 17. (Original) The vapor generator of claim 16, wherein a water supply time point inside of the case and an 'on' time point of the heater are detected by the first and third detecting rods, and an 'off' time point of the heater is detected by the first and second detecting rods.
  - 18. (Currently Amended) A vapor generator of a drum washing machine comprising:
    a case provided with a space portion for storing water therein, a water supplying portion

for supplying water at one side thereof, and a vapor exhaustion portion for exhausting vapor at

another side thereof;

a water level detecting means installed at the case for detecting a level of water stored in the case; and

a heater installed in the case for heating water stored in the case,

The vapor generator of claim 3, wherein a mounting bracket is formed at one side of the case.

19. (Currently Amended) The vapor generator of claim 18, further comprising A vapor generator of a drum type washing machine comprising:

Amendment dated February 5, 2007 Reply to Office Action of October 5, 2006

a case provided with a space portion for storing water therein, a water supplying portion for supplying water at one side of an upper portion thereof, a vapor storing portion for storing vapor at another side of the upper portion thereof, and a vapor exhaustion portion for exhausting vapor at the vapor storing portion;

a water level detecting means installed at the case for detecting a level of water stored in the case:

a heater installed in the case for heating water stored in the case; and a diaphragm formed at an inner upper surface of the case.

- (Original) The vapor generator of claim 19, wherein the diaphragm is provided 20. with slots in a longitudinal direction.
- (New) The vapor generator of claim 7, wherein the water level detecting means is 21. a water level detecting sensor comprising:
  - a body coupled to an upper portion of the case; and a plurality of detecting rods longitudinally installed at the body.
- (New) The vapor generator of claim 21, wherein said plurality of detecting rods 22. are arranged at the body and a diaphragm is installed at the body for covering the detecting rods.
  - (New) The vapor generator of claim 21, wherein the detecting rods comprise: 23.
  - a first detecting rod which has a longest length;
  - a second detecting rod which has a middle length; and
  - a third detecting rod which has a shortest length.

Docket No.: 0630-1906P